



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1456  
Alexandria, Virginia 22313-1456  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/975,036	10/10/2001	Jay M. Short	DIVER1280-17	2400

7590

07/25/2003

Lisa A. Haile, Ph.D.  
Gray Cary Ware & Freidenrich LLP  
Suite 1100  
4365 Executive Drive  
San Diego, CA 92121-2189

EXAMINER

FORMAN, BETTY J

ART UNIT

PAPER NUMBER

1634

DATE MAILED: 07/25/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary****Application No.**

09/975,036

**Applicant(s)**

SHORT ET AL.

**Examiner**

BJ Forman

**Art Unit**

1634

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 1 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 10 October 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-211 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☐ Claim(s) \_\_\_\_\_ is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☒ Claim(s) 1-211 are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.  
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All b) ☐ Some \* c) ☐ None of:  
1. ☐ Certified copies of the priority documents have been received.  
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
\* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).  
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☒ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

- 1) ☐ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_
- 2) ☐ Notice of Draftsperson's Patent Drawing (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_\_. 6) ☐ Other:

### **Election/Restrictions**

1. Restriction to one of the following inventions is required under 35 U.S.C. 121:
  - I. Claims 1-46, drawn to a method for identifying a polynucleotide in a liquid phase, classified in class 435, subclass 6.
  - II. Claims 47-90, drawn to a method for identifying a polynucleotide encoding a polypeptide, classified in class 435, subclass 68.1.
  - III. Claims 91-94, drawn to a method of screening for a polynucleotide encoding an activity, classified in class 435, subclass 7.
  - IV. Claims 95-104, drawn to a method for obtaining an organism, classified in class 424, subclass 93.2.
  - V. Claims 105-164, drawn to a method for identifying a bioactivity, classified in class 435, subclass 4.
  - VI. Claims 165-185, 201-101 and 209-210, drawn to an apparatus, classified in class 435, subclass 283.1.
  - VII. Claims 186-200, drawn to a method of incubating a bioactivity, classified in class 435, subclass 6.
  - VIII. Claims 203-208, drawn to a recovery apparatus, classified in class 422, subclass 68.1.
  - IX. Claim 211, drawn to a method of enriching for a polynucleotide, classified in class 435, subclass 6.
2. The inventions are distinct, each from the other because of the following reasons:

a. Inventions I-V & VII-IX and VI are related as process and apparatus for its practice. The inventions are distinct if it can be shown that either: (1) the process as claimed can be practiced by another materially different apparatus or by hand, or (2) the apparatus as claimed can be used to practice another and materially different process. (MPEP § 806.05(e)). In this case the processes as claimed can be practiced by another materially different apparatus or by hand i.e. the methods of Inventions I-V & VII-IX can be practiced by hand utilizing a membrane or electrophoresis gel and do not require the capillaries of Invention VI. Furthermore, the apparatus of Invention VI can be used to practice another and materially different process i.e. the capillaries of Invention VI can be used to separate inorganic material.

b. Inventions I, II, III, IV, V, VII, VIII and IX are independent and distinct methods. Inventions are independent and distinct if it can be shown that they are not disclosed as capable of use together and they have different modes of operation, different functions, or different effects (MPEP § 806.04, MPEP § 808.01). In the instant case the different methods are not disclosed as capable of use together and they have different modes of operation and different functions. Specifically, the method of Invention I operates by hybridizing a plurality of polynucleotides with a probe and the method functions to identify a polynucleotide; the method of Invention II operates by co-encapsulating in a microenvironment a plurality of clones with a mixture of labeled probes to thereby identify a clone and the method functions to identify a polynucleotide encoding a polypeptide; the method of Invention III operates by normalizing polynucleotides from an obtained sample; generating a library of the normalized polynucleotides and contacting with a labeled probe encoding an activity-specific polypeptide and the method functions to identify a polynucleotide encoding an activity; the method of Invention IV operates by encapsulating an organism and sorting the encapsulated organism and the method functions to obtain a sorted organism; the method of Invention V operates by transferring a clone library into a bacterial host and contacting the bacterial host with a mammalian host cell containing a reporter and the method functions to identify a bioactivity;

Art Unit: 1634

the method of Invention VII operates by introducing a component in to a capillary having a lumen for retaining the component and introducing a second component in to the capillary and the method functions to incubate a bioactivity; Invention VIII operates by operates as a recovery apparatus comprising an ejector and operates to recover a sample from a capillary; and the method of Invention IX operates by contacting a mixed population of polynucleotides with a labeled probe encoding an activity-specific polypeptide and the method functions to enrich for a polynucleotide encoding an activity.

3. Because these inventions are distinct for the reasons given above and have acquired a separate status in the art because of their recognized divergent subject matter, restriction for examination purposes as indicated is proper.

4. Because these inventions are distinct for the reasons given above and the search required for Group I is not required for Group II-IX, restriction for examination purposes as indicated is proper.

5. A telephone call was made to Lisa Haile on 23 July 2003 to request an oral election to the above restriction requirement, but did not result in an election being made.

6. Applicant is advised that the reply to this requirement to be complete must include an election of the invention to be examined even though the requirement be traversed (37 CFR 1.143).

7. Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the

Art Unit: 1634


application. Any amendment of inventorship must be accompanied by a request under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

### **Conclusion**

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to BJ Forman whose telephone number is (703) 306-5878. The examiner can normally be reached on 6:30 TO 4:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Gary Benzion can be reached on (703) 308-1119. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 308-4242 for regular communications and (703) 308-8724 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0196.



BJ Forman, Ph.D.  
Patent Examiner  
Art Unit: 1634  
July 23, 2003